

IN THE CLAIMS:

1. (currently amended). A method for diagnosing cancer in a subject comprising detecting or measuring an SGA-56M gene product in a sample derived from said subject, wherein the SGA-56M gene product is:

- (a) an RNA corresponding to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4;
- (b) a protein comprising SEQ ID NO:5;
- (c) a protein comprising SEQ ID NO:6;
- (d) a nucleic acid comprising a sequence hybridizable to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4, or a complement thereof, ~~under conditions of high stringency~~, or a protein comprising a sequence encoded by said hybridizable sequence;
- (e) a nucleic acid at least 90% homologous to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4 or a complement thereof ~~as determined using an NBLAST algorithm~~, or a protein encoded thereby;

wherein detecting or measuring elevated levels of the SGA-56M gene product relative to a non-cancerous sample or a pre-determined standard value for a non-cancerous sample indicates the presence of cancer in the subject.

2-4. (canceled).

5. (original). The method of claim 1, wherein the SGA-56M gene product is a nucleic acid encoding SEQ ID NO:5 or SEQ ID NO:6.

6. (original). The method of claim 1, wherein the SGA-56M gene product is a protein comprising SEQ ID NO:5 or SEQ ID NO:6.

7. (original). The method of claim 1, wherein the SGA-56M gene product is an mRNA corresponding to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4.

8. (original). The method of claim 1, wherein an antibody immunologically specific for an SGA-56M gene product is used for detecting or measuring the SGA-56M gene product.

9-26. (canceled).

27. (currently amended). A method for treating a cancer in a subject, comprising administering to the subject a therapeutically effective amount of a compound capable of antagonizing expression and/or activity of an SGA-56M gene product, wherein said SGA-56M gene product is:

- (a) an RNA corresponding to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4;
- (b) a protein comprising SEQ ID NO:5;
- (c) a protein comprising SEQ ID NO:6;
- (d) a nucleic acid comprising a sequence hybridizable to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4, or a complement thereof, ~~under conditions of high stringency~~, or a protein comprising a sequence encoded by said hybridizable sequence;
- (e) a nucleic acid at least 90% homologous to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4, or a complement thereof, ~~as determined using an NBLAST algorithm~~, or a protein encoded thereby;

wherein said administering reduces expression and/or activity of the SGA-56M gene product.

28. (original). The method of claim 27, wherein the compound decreases expression of the SGA-56M gene product, wherein the SGA-56M gene product is a nucleic acid encoding SEQ ID NO:5 or SEQ ID NO:6.

29. (original).The method of claim 27, wherein the compound decreases expression of the SGA-56M gene product, wherein the SGA-56M gene product is a protein comprising SEQ ID NO:5 or SEQ ID NO:6.

30. (original). The method of claim 27, wherein the compound decreases expression of the SGA-56M gene product and wherein the SGA-56M gene product is an RNA corresponding to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4.

31. (original). The method of claim 27, wherein the cancer is breast or lung cancer.

32-34. (canceled).

35. (original). The method of claim 27, wherein the compound is an antibody immunologically specific for an SGA-56M gene product.

36-37. (canceled).

38. (original). The method of claim 27, wherein the compound is capable of modulating expression and/or activity of a specific binding partner of an SGA-56M molecule.

39. (original). The method of claim 38, wherein said specific binding partner is a peptide, protein, or nucleic acid sequence.

40. (original). The method of claim 38, wherein said SGA-56M molecule is selected from the group consisting of an SGA-56M protein or variant thereof or a nucleic acid sequence encoding an SGA-56M protein or variant thereof.

41-99. (canceled).

100. (currently amended). An immunogenic composition comprising:

(a) an isolated SGA-56M gene product in an amount effective to elicit an immune response, wherein said gene product is:

(i) an RNA corresponding to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4;

- (ii) an isolated protein comprising SEQ ID NO:5;
- (iv) an isolated nucleic acid comprising a sequence hybridizable to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4, or a complement thereof, under conditions of high stringency, or a protein comprising a sequence encoded by said hybridizable sequence;
- (v) an isolated nucleic acid at least 90% homologous to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4, or a complement thereof, as determined using an NBLAST algorithm, or a protein encoded thereby;

and

- (b) a pharmaceutically acceptable carrier.

101. (currently amended). The immunogenic composition of claim 100, wherein the SGA-56M gene product is a nucleic acid at least 90% homologous to SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, or SEQ ID NO:4 as determined using an NBLAST algorithm.

102. (currently amended). The immunogenic composition of claim 100, wherein the composition is an antibody immunologically specific for SGA-56M gene product is a protein comprising SEQ ID NO:5 or SEQ ID NO:6.

103-110. (canceled).

111. (currently amended). The immunogenic composition of claim 100 method of claim 109, wherein the composition compound is an antibody immunologically specific for an SGA-56M molecule.

112-115. (canceled).

116. (new). The immunogenic composition of claim 100, wherein the SGA-56M gene product is a protein comprising SEQ ID NO:5 or SEQ ID NO:6.

117. (new). The immunogenic composition of claim 100, wherein the composition is an antibody immunologically specific for a protein comprising SEQ ID NO:5 or SEQ ID NO:6.